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**COMPLOI et al.**(10) **Pub. No.: US 2018/0348535 A1**(43) **Pub. Date: Dec. 6, 2018**(54) **ACCURATE AND BALANCED LIGHTING IN  
A PEPPER'S GHOST PROJECTION SYSTEM  
FOR LIVE CINEMATIC PERFORMANCES****H04N 13/305** (2018.01)**G03B 21/28** (2006.01)(52) **U.S. Cl.****CPC** ..... **G02B 27/2292** (2013.01); **G09G 3/003**(2013.01); **G03B 21/26** (2013.01); **G03B 21/28**(2013.01); **G02B 27/2235** (2013.01); **G02B****27/2214** (2013.01); **H04N 13/305** (2018.05)(71) Applicant: **DISNEY ENTERPRISES, INC.,**  
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(57)

**ABSTRACT**

A display system that is particularly well-suited for use in providing or displaying a live cinematic performance to an audience. The system includes a first space that is directly viewable by the audience and that is illuminated with a stage lighting assembly. Human, robotic, or other physical performers are positioned in the first space and selectively illuminated by light from the stage lighting. The system includes a Pepper's ghost assembly configured to provide enhanced brightness of the projected image as background items in the Pepper's ghost assembly's space are hidden from view by the audience. The Pepper's ghost assembly may include one or more high speed projectors or other light sources, a high speed vision system, and black retroreflective material, and these components function in combination to allow the assembly to be operated to selectively light objects and people in the hidden space without projecting the background to the audience.

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Jun. 5, 2017, now Pat. No. 9,989,777.**Publication Classification**(51) **Int. Cl.****G02B 27/22** (2018.01)**G09G 3/00** (2006.01)**G03B 21/26** (2006.01)